

ABSTRACT

AN CONTROLLER INTERNAL BUS SUPPORTING THE TCP/IP
PROTOCOL

5 The present invention relates to a communications
system in a programmable controller comprising smart
modules, a network module connected to a TCP/IP network
and an internal communications bus, for example the
backplane bus connecting all the modules of the
programmable controller with each other. The
communications system enables exchanges of information
in compliance with the TCP/IP protocol, to be performed
on the internal communications bus. Each smart module
10 has its own IP address and a TCP/IP stack. The
communications bus includes several separate
communications channels providing for simultaneous flow
of the frames complying with the TCP/IP protocol
together with frames complying with other protocols.
15 The invention also relates to a programmable controller
capable of implementing such a communications system.

Fig.1